

AMENDMENTS TO THE CLAIMS:

This listing of claims will replace all prior versions and listings of claims in the application:

Claims 1-20 (Cancelled).

21. (Currently Amended) A method for locating a terminal in a local wireless telecommunications network performed at a locating system comprising a plurality of base stations that provide services on respective coverage areas, adapted to provide that provides a location estimation of the terminal depending on a set of configuration data and on a set of measuring data indicating whether the terminal belongs to a subset of said coverage areas and acquired from terminal or network, wherein the network comprises a plurality of base stations providing services on a plurality of coverage areas, comprising:

defining a set of configuration data comprising a plurality of configuration data base entries bases, each one configuration data base entry having a respective weight function;

defining acquiring a set of measuring data from the terminal or the network comprising a plurality of measuring data types, wherein each measuring data type depending depends on the type of terminal and the set of measuring data indicates whether the terminal belongs to a subset of said plurality of coverage areas;

associating, through different combinations of configuration data bases and measuring types, respective each of a plurality of locating procedures that correspond to accuracy values of the location estimation with a different combination of at least one

of the plurality of configuration data base entries and at least one of the plurality of measuring data types, wherein each of the plurality of locating procedures corresponds to an accuracy value of the location estimation; and

selectively actuating at least one of the plurality of locating procedure procedures obtained from said associating step to provide the location estimation.

22. (Currently Amended) The method according to claim 21, wherein said step-of selectively actuating comprises selecting [[a]] one of the plurality of locating procedure procedures depending on a set of available measuring data and on a prefixed accuracy threshold value of the locating location estimation, in such a way that said procedure one of the plurality of locating procedures has an accuracy value that is not less than the prefixed threshold value, minimising the weight function of the at least one of the plurality of configuration data base entries associated with said one of the plurality of locating procedures.

23. (Currently Amended) The method according to claim 21, wherein said step-of selectively actuating comprises selecting [[a]] one of the plurality of locating procedure procedures depending on a set of available measuring data and on a prefixed set of available configuration data, in such a way that said one of the plurality of locating procedures procedure has the best possible accuracy value of the location estimation.

24. (Currently Amended) The method according to claim 21, wherein said step of selectively actuating comprises selecting [[a]] one of the plurality of locating procedure procedures depending on a set of available measuring data and on a prefixed set of available configuration data, in such a way that said one of the plurality of locating procedures procedure has the best response speed to the location estimation request.

25. (Currently Amended) The method according to claim 21, wherein said step of selectively actuating comprises a step of selecting [[a]] one of the plurality of locating procedure procedures depending on a set of available measuring data and on a prefixed set of available configuration data, in such a way that said one of the plurality of locating procedures procedure has a pricing value in compliance with a value predefined by [[the]] a user.

26. (Currently Amended) The method according to claim 21, wherein said set of configuration data comprises at least one configuration data base entry among the plurality of configuration data base entries among a plurality of data bases related to:
locating coordinates of the base stations;
radio-electric characteristics of the network;
structural and/or electromagnetic characteristics of the environment in which the network is deployed; and

radio-electric or performance parameters of signals transmitted from the base stations, in predetermined space positions belonging to the coverage area of the network.

27. (Currently Amended) The method according to claim 21, wherein said set of measuring data acquired by the terminal or the network comprises at least one measuring data type of data among [[a]] the plurality of measuring data types of data related to:

identification of the base station by which the terminal is served;
identification of the base stations received by the terminal;
at least one radio-electric or performance parameter of signals transmitted from the base station by which the terminal is served; and
at least one radio-electric or performance parameter of signals transmitted by the base stations received by the terminal.

28. (Currently Amended) The method according to claim 22, further comprising the temporary exclusion of temporarily excluding a set of configuration data from said plurality of configuration data base entries.

29. (Currently Amended) The method according to claim 21, further comprising transferring a preliminary transfer operation, [[on a]] to the terminal of the network, of processing programs for performing at least one subset of said plurality of locating procedures[[,]] and [[of]] at least one subset of said plurality of configuration

data base entries bases used by the transferred locating procedures, whereby the location estimation is performed by the terminal and information about estimated position and estimation accuracy are transmitted from the terminal to [[a]] the locating system upon every service request.

30. (Currently Amended) The method according to claim 29, wherein a synthesis or model of the at least one subset of said plurality of configuration data base entries is transferred.

31. (Currently Amended) The method according to claim 29, wherein the selection of the at least one subset set of said plurality of locating procedures that can be performed by [[a]] the terminal occurs depending on measures that the terminal is able to perform and/or the required locating accuracy and/or the applied pricing when using the terminal.

32. (Currently Amended) The method according to claim 21, further comprising the operation of creating and maintaining a data base for storing [[the]] a time succession of estimated positions of [[a]] the terminal.

33. (Currently Amended) The method according to claim 21, wherein [[the]] at least one of the plurality of locating procedures procedure associated with [[the]] a combination of at least one of the plurality of [[a]] configuration data base entries related to locating coordinates of the base stations, and possibly the radio-electric-

characteristics of the network, and still possibly the structural/electromagnetic characteristics of the environment in which the network is deployed, with and at least one of the plurality of measuring data types measures related to the identification of the base station by which the terminal is served, estimates the position of the terminal corresponding to the barycenter coordinates of the coverage area of said base station and an uncertainty value, the uncertainty value being defined by the distances from said barycenter to all points of the coverage area, wherein the at least one of the plurality of configuration data base entries relates to locating coordinates of the base stations, locating coordinates of the base stations and radio electric characteristics of the network, or locating coordinates of the base stations and radio electric characteristics of the network and the structural/electromagnetic characteristics in which the network is deployed, and the at least one of the plurality of measuring data types relates to the identification of the base station by which the terminal is being served.

34. (Currently Amended) The method according to claim 33, wherein the at least one of the plurality of locating procedures procedure associated with the combination of a configuration data base related to locating coordinates of the base stations and possibly the radio-electric characteristics of network, and still possibly the structural/electromagnetic characteristics of the environment in which network is deployed, with measures related to the identification of the base station by which terminal is served and the identifications of the base stations received by the terminal, estimates the position of the terminal corresponding to the barycenter coordinates of a coverage sub-area of the base station by which the terminal is served comprising the

points nearer to the base stations received by the terminal with respect to unreceived base stations and an uncertainty value, the uncertainty value being defined depending on the distances from said barycenter to all points of the sub-area, and the at least one of the plurality of measuring data types further relates to the identifications of the base stations received by the terminal.

35. (Currently Amended) The method according to claim 33, wherein the at least one of the plurality of locating procedure procedures associated with the combination of a configuration data base related to locating coordinates of the base stations and possibly the radio-electric characteristics of the network, and still possibly the structural/electromagnetic characteristics of the environment in which the network is deployed, with measures related to the identification of the base station by which the terminal is served and at least one radioelectric or performance parameter of the signal transmitted from said base station and depending on the distance from said base station to the terminal, estimates the position of the terminal corresponding to the barycenter coordinates of a coverage sub-area of said base station defined depending on the distance from said base station to the terminal estimated depending on said parameter and an uncertainty value, the uncertainty value being defined depending on the distances from said barycenter to all points of the sub-area, and the at least one of the plurality of measuring data types further relates to at least one radioelectric or performance parameter of the signal transmitted from said base station and depending on the distance from said base station to the terminal.

36. (Currently Amended) The method according to claim 34, wherein the at least one of the plurality of locating procedures procedure associated with the combination of a configuration data base related to locating coordinates of the base stations and possibly the radio-electric characteristics of the network, and still possibly the structural/electromagnetic characteristics of the environment in which the network is deployed, with measures related to the identification of the base station by which the terminal is served, to the identifications of base stations received by the terminal, to at least one radio-electric or performance parameter transmitted from said server base station and depending on the distance from said base station to the terminal, and to at least one radio-electric or performance parameter of the signal transmitted from received base stations and depending on the distance from said base stations to the terminal, estimates the position of the terminal corresponding to the barycenter coordinates of a coverage sub-area of the base station by which the terminal is served, defined depending on the distances from said base stations to the terminal and estimated depending on said parameters and an uncertainty value, the uncertainty value being defined depending on the distances from said barycenter to all points of the sub-area, and the at least one of the plurality of measuring data types further relates to at least one radio-electric or performance parameter transmitted from said server base station and depending on the distance from said base station to the terminal and at least one radio-electric or performance parameter of the signal transmitted from received base stations and depending on the distance from said base stations to the terminal.

37. (Currently Amended) A processing system for locating a terminal in a local wireless telecommunications network ~~comprising a plurality of base stations that provide services on respective coverage areas, adapted to provide by providing a~~ location estimation of the terminal, wherein the network comprises a plurality of base stations that provide services on a plurality of coverage areas, comprising:

~~storage modules for storing data bases of a plurality of configuration data parameters[[.]] and a plurality of measuring data types acquired from the terminal or the network and indicating whether the terminal belongs to a subset of said coverage areas and acquired from the terminal or the network; and~~

~~a locating processing module that associates adapted to associate, with different combinations of a data base of configurations and a measuring type, respective each of a plurality of locating procedures with a different combination of at least one of the plurality of configuration data parameters and at least one of the plurality of measuring data types, corresponding to accuracy value of the location estimation; and that performs to perform [[the]] one of the plurality of locating procedures procedure related to a selected combination to provide the location estimation, wherein each of the plurality of locating procedures corresponds to an accuracy value of the location estimation.~~

38. (Previously Presented) A local wireless telecommunications network, comprising a processing system for locating a network terminal according to claim 37.

39. (Previously Presented) A telecommunications network adapted to perform the method according to claim 21.

40. (Currently Amended) A computer-readable medium storing instructions for execution by a processing system program product or group of computer program products that can be executed by a processing system, the instructions comprising one or more code modules that when executed by the processing system perform for performing a method for locating a terminal in a local wireless telecommunications network according to claim 21.